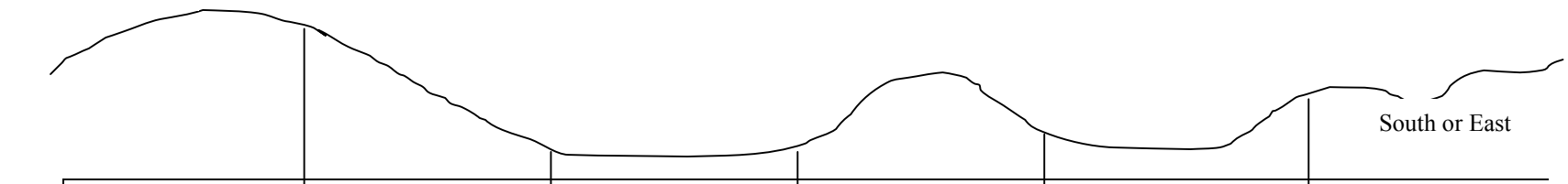
STRATHBOGIE LAND SYSTEM (Figure 21)

Area: 39 square kilometres
2 percent of catchment



Topography	Hilltop with granite tors, up to about 700 m elevation.	Steep slope	Creek on bedrock	Low rocky hill	Depressions or drainage line; often with a spring.	Rolling plateau at about 550 m elevation.
Climate	Average annual rainfall about 900 mm to 1000 mm. Growing season: March-May and September-December. Estimated average temperature: Jan 20°C; July 6°C; Year 12°C. Estimated evapotranspiration: Jan 115 mm, July 15 mm, Year 680 mm.					
Parent Materials	Granite	Granite and hill-wash	Granitic sand	Granite	Sandy hill-wash	Granite and hill-wash
Soils	Deep, sandy, pale or weakly bleached gradational soils over red clay or rock; limited areas of coarse sandy loams around larger rock outcrops.	Reddish duplex soils.	Sandy loams; little clay; pale gradational soils or gleyed loams.	Gritty; reddish duplex soils, A horizon thicker in lower sites; some deep friable reddish gradational soils with weakly structured subsoil.	Gleyed, sandy loams and pale gradational soils.	Gritty, reddish duplex soils; A horizon thin or absent on hill tops, thick in low sites; depressions may have coarse sandy, pale gradational soils.
Vegetation	Open forest of broad-leaf and narrow-leaf peppermint occasional blue gum.	Open forest of narrow-leaf peppermint and candlebark gum, the latter dominant in lower sites.	Open forest to woodland of swamp gum; some blackwood and other wattles and rushes.	Open forest of narrow-leaf peppermint.	Open forest to woodland and swamp gum, with tea-tree rushes.	Open forest of narrow-leaf peppermint.
Land Uses	Unprotected forestry; usually not fenced off from cleared land.	Partly forested, partly cleared and grazed by sheep and cattle; native and introduced pastures.	Generally unused but not fenced off	Mostly cleared; improved pastures; grazing by sheep and cattle.	Generally but not fenced off.	Cleared; partly improved; grazing by sheep and cattle.
Potential Land Use	Protected forestry; fencing to prevent unwanted grazing.	Permanent improved pastures.	Remain unused; fencing to prevent unwanted grazing.	Permanent improved pastures.	Remain unused; fencing to prevent unwanted grazing.	Permanent improved pastures.

STRATHBOGIE LAND SYSTEM

(See Fig. 2 1)

The Strathbogie land system consists of a mildly dissected, rolling to hilly, granite tableland at 520 m to 700 m elevation (Plate 16). This is a large and well defined land system, most of which is drained by the Seven Creeks system.

Only 39 square kilometres of the catchment drains to the Broken River. The topography is rolling and mildly dissected, with granite tors exposed on many hilltops. The creek lines are characteristically swampy, and fairly broad; wet flats are common in the valley bottoms.

Although most of the area is at about the same elevation, the climate varies across the width of the land system. Rainfall is highest near the plateau edge where orographic influences are pronounced. Most of the land system receives at least 900 mm rainfall, although to the west, well out of the Broken River catchment, the rainfall is lower. The growing season is approximately from March through May, and from September to December. The winters are cold and plant growth is severely retarded during these months. The effect of the mid-summer drought depends on soil depth. The hollows may remain fairly moist through most of the year whereas the hilltops, where the soils are shallow, dry off fairly early.

The native vegetation is an open forest of broad-leaf and narrow-leaf peppermint with candlebark gum, the latter becoming dominant in the hollows and with some messmate and manna gum. Swamp gum occurs along the creek lines. Much of the land system is cleared or partly cleared.

Plate 16. Rolling plateau with occasional hills make up the characteristic landscape of the Strathbogie land system. This area on the catchment boundary near Boho South has an elevation of about 600 m.

The soils are developed either on granite weathered *in-situ*, or on sandy hillwash and alluvium derived from granite. On *in-situ* weathered granite, soils are mostly of the reddish duplex group, although the boundary between the A- and B-horizons, is not as sharp as it is in the lower rainfall areas. Deep, friable reddish gradational soils, mostly with weakly structured subsoils are also wide-spread and they sometimes have almost uniform texture profiles. In depressions and along drainage lines there are gleyed sandy gradational soils and gleyed loams.

The present land use is mainly grazing of sheep and cattle on native and improved pastures. Additional fencing and pasture improvement are of prime importance in the development of the area for grazing. Although there are a number of well developed properties much of the area is still being used at well below its potential.

The erosion hazard is moderate on the steeper slopes but the generally favourable climate results in good vegetative protection of the soil under the usually acceptable forms of use.